**Nomenclature**

|  |  |
| --- | --- |
| **Notation** | **Description** |
| *A* | Independent variable in RSM (Current density, mA/cm2) |
| *B* | Independent variable in RSM (Solution pH) |
| *C* | Independent variable in RSM (Electrolysis time in min) |
| Ct | Pigment concentration at time t (mg/m3) |
| C0 |  Pigment concentration at time t0 (mg/m3) |
| df | Degree of freedom |
| F | Faraday’ constant, 96500 C/mol |
| *I* | Current used in EC process (ampere) |
| *R2* | Coefficient of regression |
| *T* | Time of EC process (hour) |
| *U* | Cell voltage (V) |
| *V* | Volume of water in the reactor (m3) |
| Ve | Volume of extract (ml)  |
| Vs | Volume of sample(L)  |
| *y* | Dependent variable |
| τ | Time of electrolysis at which ICE is almost zero |
| S |  Path length of cuvette (cm) |
| μ |  Photosynthetic growth rate(d-1) |